



# **ASR-P252B C# Demo App for Windows Devices**

## **User's Manual**

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## Revision History

Version	Modified Contents	Date
V1.0	Initial version	2023/10/10

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## Preface

This document describes the correct operation method of the “ASR-P252B Demo App” for Windows. Be sure to read this carefully before using the app.

If you have any comments or questions about this manual, please don't hesitate to get in touch with us at:

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## About the Demo App for ASR-P252B

The "ASR-P252B Demo App" (hereinafter referred to as "Demo App") is an application that customers can use together with our company's ASR-P252B device (hereinafter referred to as "AsReader").

Please download this application from the link below under the "C# Sample" heading.

<https://asreader.com/products/asr-p252b/?SDK>

Note: The ASR-P252B Demo App is a dedicated Demo App for ASR-P252B devices.

# 1 Connection

---

## 1.1. Connecting to PC

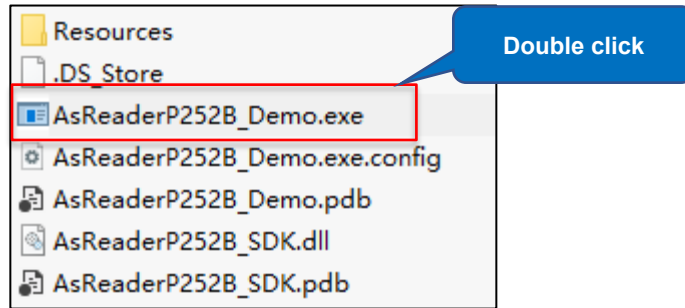
1. Power on the AsReader. Two beep sounds indicate that the AsReader is powered on.
2. Connect the AsReader with the USB port of a Windows PC using a USB-C data cable. A steady light of the LED indicator and a beep sound indicate that the AsReader is successfully connected to the PC.

\* For details about Bluetooth connection, please refer to the "PADDLE-Type User's Manual".

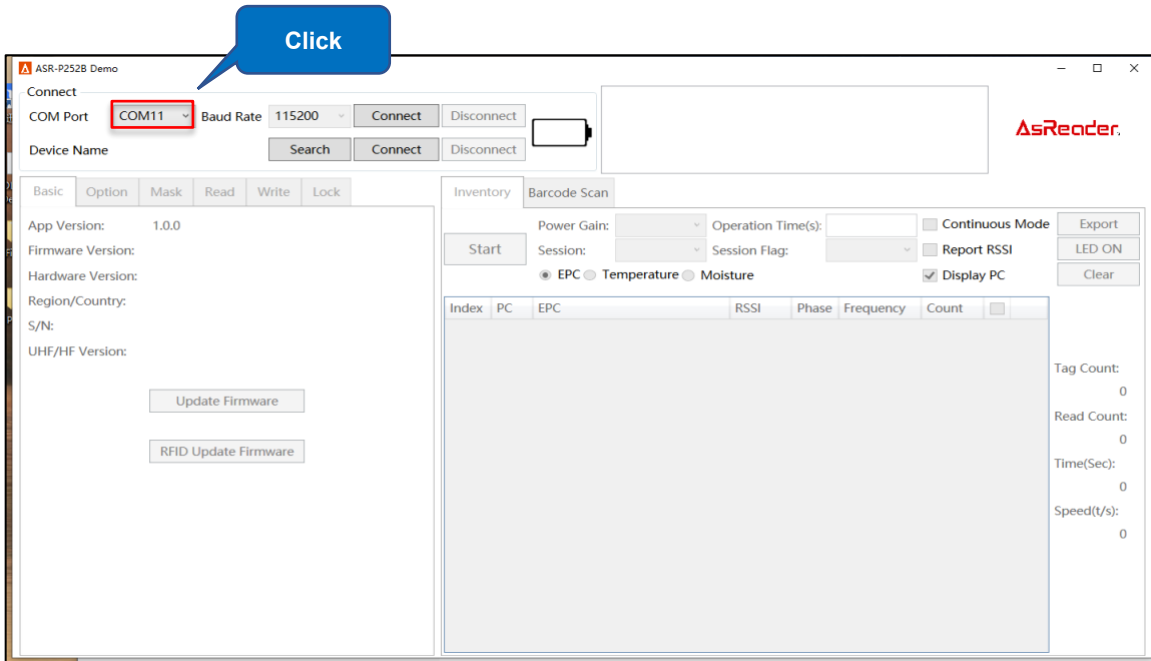


## 1.2. Starting the App

Double click "AsReaderP252B\_Demo.exe".



The page below is displayed:

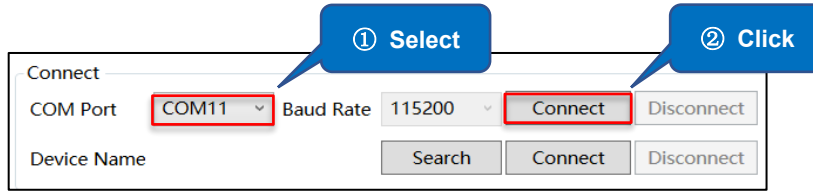


\* If the app is started before the AsReader is connected, the COM Port box may be empty. It is recommended to click the COM Port drop-down list to get the COM Port.

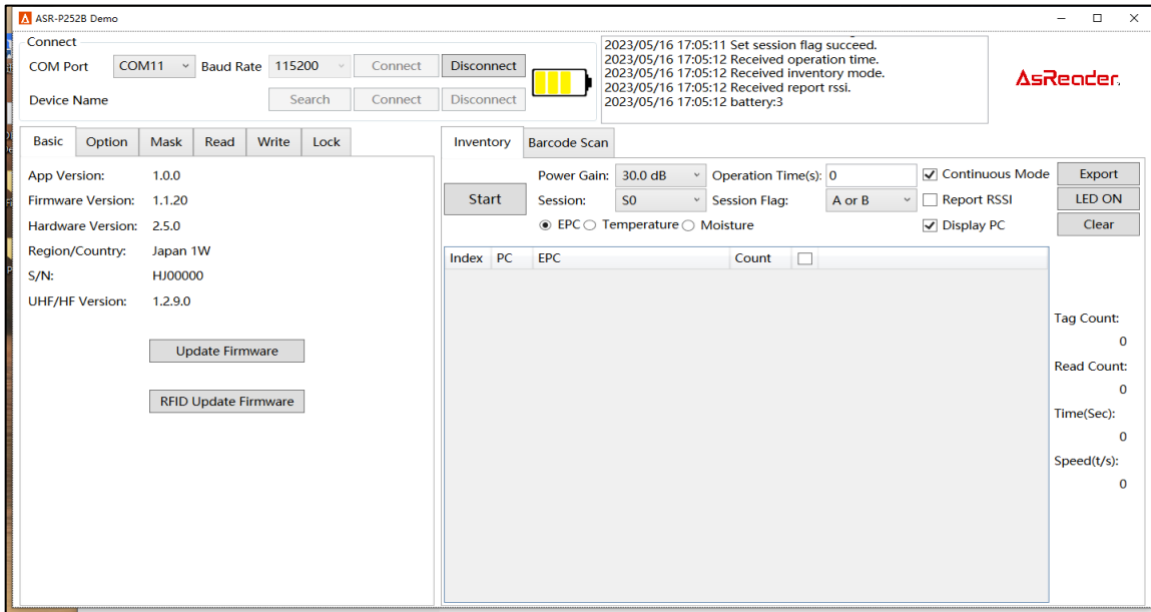


### 1.3. Connecting

Select the correct COM port and click “Connect” to connect the AsReader.

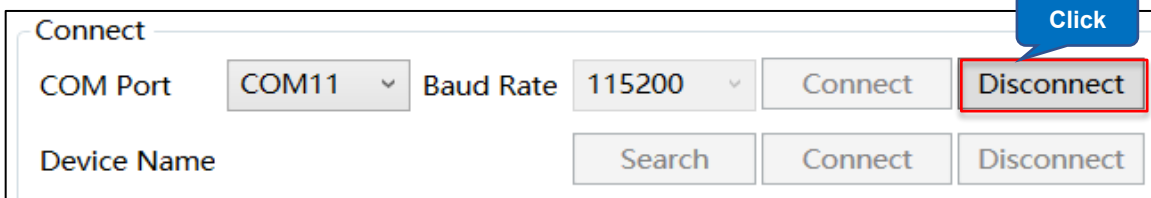


The page is displayed as below once connected.



### 1.4. Disconnecting

Click “Disconnect” to disconnect from the AsReader.

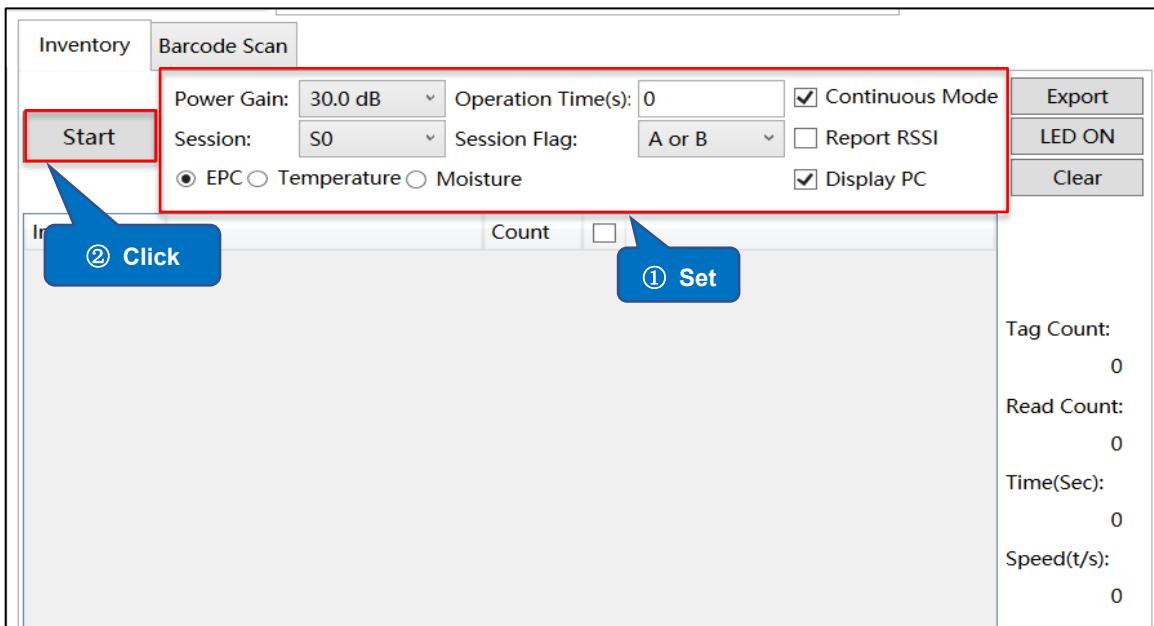


# 2 Inventory of RFID Tags

## 2.1. Inventory

- **Operating steps:**

1. Configure the operation time and other settings.
2. Click "Start" in the app and the name of the button changes to "Stop". The AsReader starts the inventory and displays the data of the inventoried RFID tags in real time. The AsReader can also start an inventory when its trigger button is pressed.
3. Click "Stop" to stop the inventory. When an operation time is set, the inventory automatically stops after the set time.



Inventory Barcode Scan

Power Gain: 30.0 dB Operation Time(s): 0  Continuous Mode **Export**

**Stop** Session: S0 Session Flag: A or B  Report RSSI **LED ON**


EPC  Temperature  Moisture  Display PC **Clear**

Index	PC	EPC	RSSI	Phase	Frequency	Count	
16	35FD	555511700000020CE0CE6847	-48.8dB	219°	920.4MHz	127	
17	3400	E28011700000020CE0CFC4D6	-59.1dB	276°	920.4MHz	136	
18	3400	123456780000020CE0CE68F2	-50.4dB	68°	920.4MHz	137	
19	3400	E28011700000020CE0CE8A83	-37.8dB	236°	920.4MHz	139	
20	3400	E28011700000020CE0CE2AA7	-40.3dB	228°	920.4MHz	139	
21	3400	E28011700000020CE0CF5AB3	-63.6dB	259°	920.4MHz	56	
22	3400	E28011700000020CE0CE6836	-74.4dB	284°	920.8MHz	7	
23	3400	30347A12040005C000087A23	-42.8dB	323°	920.4MHz	137	
24	35FD	E28011700000020CE0CF38D3	-55.8dB	194°	920.4MHz	134	
25	3400	E28011700000020CE0CE8A44	-66.8dB	0°	920.4MHz	122	
26	3400	E28011700000020CE0CE34F6	-68.4dB	3°	920.4MHz	81	
27	3400	E28011700000020CE0CE6817	-49.8dB	222°	920.4MHz	17	

Tag Count: 32  
Read Count: 3291  
Time(Sec): 15  
Speed(t/s): 447



Notification area

Disconnect  **AsReader**

2023/05/16 17:43:35 Stop succeed.  
2023/05/16 17:43:49 Start inventory succeed.  
2023/05/16 17:44:11 Stop succeed.  
2023/05/16 17:44:11 Stop succeed.  
2023/05/16 17:44:11 Stop succeed.

Inventory Barcode Scan

Power Gain: 30.0 dB Operation Time(s): 0  Continuous Mode **Export**

**Start** Session: S0 Session Flag: A or B  Report RSSI **LED ON**

EPC  Temperature  Moisture  Display PC **Clear**

Index	PC	EPC	RSSI	Phase	Frequency	Count	
16	35FD	555511700000020CE0CE6847	-49.8dB	225°	918MHz	248	
17	3400	E28011700000020CE0CFC4D6	-57.6dB	307°	918MHz	260	
18	3400	123456780000020CE0CE68F2	-53.0dB	267°	918MHz	260	
19	3400	E28011700000020CE0CE8A83	-37.8dB	262°	918MHz	262	
20	3400	E28011700000020CE0CE2AA7	-38.9dB	233°	918MHz	262	
21	3400	E28011700000020CE0CF5AB3	-64.3dB	104°	918MHz	144	
22	3400	E28011700000020CE0CE6836	-74.4dB	284°	920.8MHz	7	
23	3400	30347A12040005C000087A23	-43.8dB	155°	918MHz	258	
24	35FD	E28011700000020CE0CF38D3	-55.8dB	6°	918MHz	263	
25	3400	E28011700000020CE0CE8A44	-63.0dB	211°	918MHz	233	
26	3400	E28011700000020CE0CE34F6	-69.7dB	217°	918MHz	106	
27	3400	E28011700000020CE0CE6817	-51.6dB	68°	918MHz	138	
28	35FD	E28011700000020CE0CF38E3	-53.0dB	146°	918MHz	139	

Tag Count: 32  
Read Count: 6554  
Time(Sec): 35  
Speed(t/s): 148

Tag list

Inventory results

- The meanings of the fields in the Tag list are as follows:

Fields	Descriptions
Index	The sequence number of the data
PC	PC bank of the RFID tag
EPC	EPC bank of the RFID tag
RSSI*1	The signal strength of the RFID tag in the last inventory
Phase*1	The phase of the RFID tag
Frequency*1	The operating frequency of the AsReader during the inventory
Count	The count of times of reading the RFID tag
Moisture*2	Moisture
Temperature*2	Temperature

\*1 RSSI, Phase, and Frequency fields are displayed only when Report RSSI is checked.

\*2 The Moisture and Temperature fields are displayed only when either "Temperature" or "Moisture" in the EPC/Temperature/Moisture option is selected.

- The meanings of the fields in the Inventory results area are as follows:

Fields	Descriptions
Tag Count	Number of the inventoried RFID tags (counting each unique tag only once, even if the same tags are repeatedly inventoried)
Read Count	Total inventory times (keep counting when the same tag is repeatedly inventoried)
Time (Sec)	The inventory duration after each click of the "Start". (Unit: seconds)
Speed (t/s)	Inventory speed. Unit: number of inventoried tags per second

## 2.2. Inventory page

The screenshot shows the 'Inventory' page with a 'Barcode Scan' tab selected. A 'Start' button is on the left. The main control area contains the following elements:

- Power Gain:** 30.0 dB (1) with a dropdown arrow.
- Operation Time(s):** 0 (2) with a dropdown arrow.
- Continuous Mode:**  (6)
- Session:** S0 (3) with a dropdown arrow.
- Session Flag:** A or B (4) with a dropdown arrow.
- Report RSSI:**  (7)
- EPC/Temperature/Moisture:** Radio buttons for EPC (selected), Temperature, and Moisture (5).
- Display PC:**  (8)

**① Power Gain**

Set/Get the power of the AsReader (dB). In general, the larger the value of power is set, the farther the reading distance and the more battery consumption are.

Range: 2 to 30.

This setting is saved to the AsReader.

**② Operation Time**

Set the inventory time. The AsReader stops the inventory as soon as the set time has passed. This setting is saved to the AsReader.

Unit: seconds (0 = unlimited).

\* Only works if Continuous Mode is on.

**③ Session**

Set/Get Session. This setting is saved to the AsReader.

"Session" and "Session Flag" can be set to adjust the response time of RFID tags.

(Response times vary with RFID tag specifications.)

Session Flag	S0	S1	S2/S3
<b>A only</b>	The RFID tags that have been inventoried will immediately become ready to be inventoried again after receiving the radio waves.	The RFID tags that have been inventoried cannot be inventoried again within 0.5~5 seconds after being inventoried.	The RFID tags that have been inventoried cannot be inventoried again within 2~60 seconds after being inventoried.
<b>B only</b>	RFID tags in the initial state cannot be inventoried.	The RFID tags cannot be inventoried during the first inventory. The RFID tags that have been inventoried cannot be inventoried again until the inventory starts again.	The RFID tags cannot be inventoried during the first inventory. The RFID tags that have been inventoried cannot be inventoried again until the inventory starts again.
<b>A or B</b>	The RFID tags that have been inventoried will immediately become ready to be inventoried again after receiving the radio waves.	The RFID tags that have been inventoried cannot be inventoried again within 0.5~5 seconds after being counted.	

**④ Session Flag**

Set the inventory target to Flag A or Flag B. It can be set to A Only, B Only, or A or B.

This setting is saved to the AsReader.

#### ⑤ **EPC/Temperature/Moisture**

Select the type of RFID tags to inventory.

- **EPC:** Inventories regular RFID tags. The PC and EPC values of the tags are displayed in the tag list.
- **Temperature:** Inventories temperature sensor tags. The PC, EPC, and temperature values are displayed in the tag list.

\* When inventorying temperature sensor tags, do NOT set Option → Link Profile to 3.

- **Moisture:** Inventories moisture sensor tags. The PC, EPC, and moisture values are displayed in the tag list.

#### ⑥ **Continuous Mode**

On or off continuous inventory RFID tag mode.

Not selected: Single inventory. The AsReader automatically stops the inventory once an RFID tag is read.

Selected: Continuous inventory. The AsReader continues to inventory multiple RFID tags once the "Start" is clicked until "Stop" is clicked or the set Operation Time has passed.

#### ⑦ **Report RSSI**

Set whether to display the received signal strength indication of the inventoried RFID tags.

Selected: display, Not selected: hide.

This setting is saved to the AsReader.

#### ⑧ **Display PC**

Sets whether to display the PC (Protocol Control) values of the inventoried RFID tags.

Checked: display, Unchecked: hide.

## 2.3. RFID Data Export

Click "Export" to export the RFID tag data in the tag list as a CSV file.

## 2.4. LED ON

Index	PC	EPC	Count	
1	3400	E28011700000020CE0CE2AE7	14	<input checked="" type="checkbox"/>
2	3400	E28011700000020CE0CE8A83	14	<input type="checkbox"/>
3	3400	E28011700000020CE0CE6827	15	<input type="checkbox"/>

Tag Count:

Click "LED ON" to light the LED tags selected in the list. Multiple selections are supported.

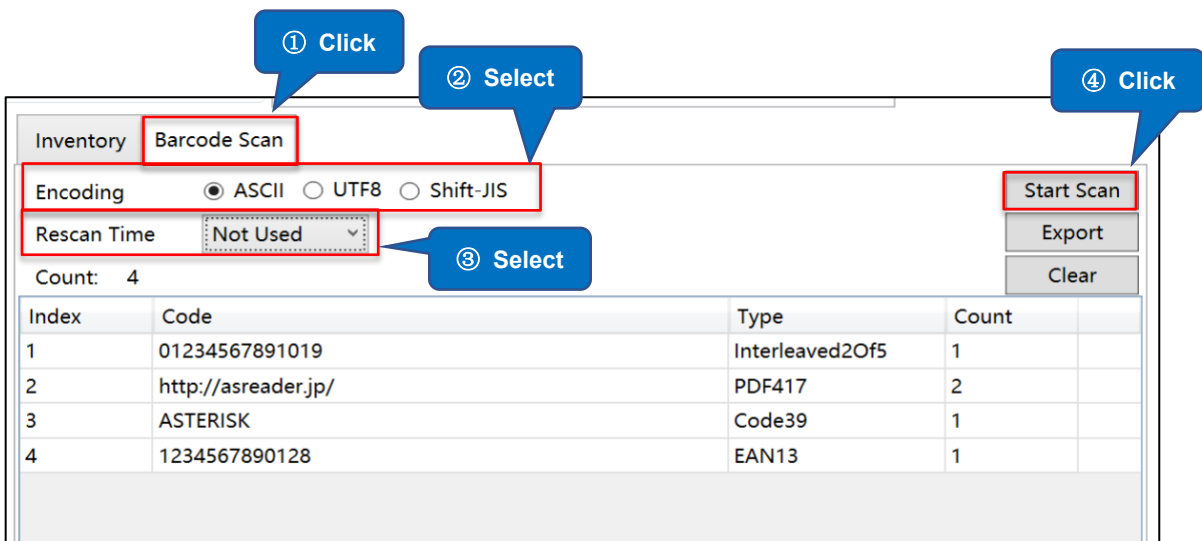
\* This function only works for LED tags.

## 2.5. Clearing the Tag List

Click "Clear" to clear the tag data displayed in the tag list.

# 3 Barcode Scan

## 3.1. 1D&2D Barcode Scan



- **Operating steps:**

1. Click "Barcode Scan" to access the barcode scanning page.
2. Select one from the three encoding types: ASCII, UTF8, and Shift JIS.
3. Set single scan or continuous scan (Rescan Time).

Single scan: Select "Not Used".

Continuous scan: Select a scanning interval.

Unit: ms (Range: 100 to 5000).

4. Press the Trigger button of the AsReader or click "Start Scan" on the app and the LED and laser light is emitted. If no barcode is scanned within the timeout time, the AsReader will stop emitting the LED and laser lights.

In single scan mode, once a barcode is successfully scanned, the AsReader stops scanning. In continuous scan mode, the AsReader continuously scans barcodes beginning when the trigger button is pressed (or the "Start Scan" is clicked) until the trigger button is pressed again (or "Stop Scan" is clicked).



\* During the scan, the "Start Scan" button on the app's page changes to "Stop Scan".

- The meanings of the fields in the barcode list are as follows:

The number of unique barcodes

Count:	4		
Index	Code	Type	Count
1	01234567891019	Interleaved2Of5	1
2	http://asreader.jp/	PDF417	2
3	ASTERISK	Code39	1
4	1234567890128	EAN13	1

Fields	Descriptions
Index	The sequence number of the barcode data
Code	Barcode data
Type	Barcode type
Count	The number of times that each barcode is scanned

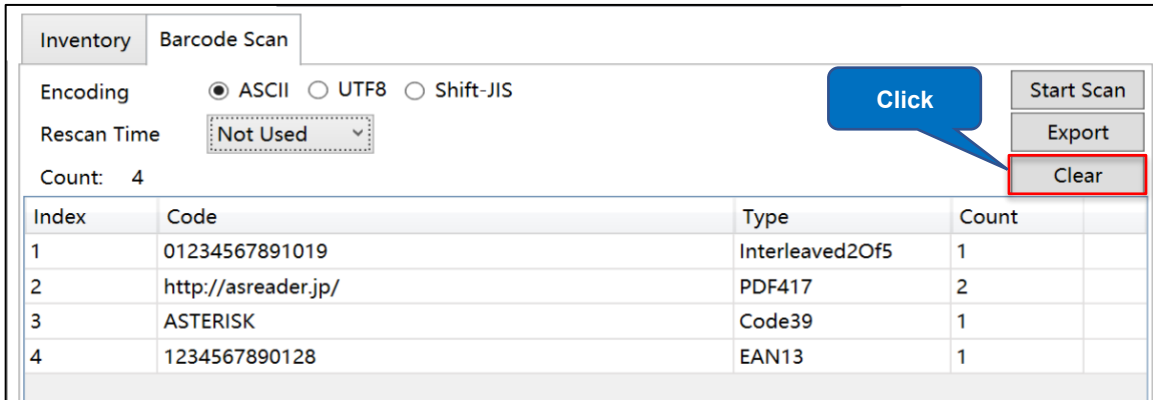
### 3.2. Barcode Data Export

The screenshot shows the 'Barcode Scan' interface. At the top, there are tabs for 'Inventory' and 'Barcode Scan'. Below the tabs, there are settings for 'Encoding' (ASCII, UTF8, Shift-JIS) and 'Rescan Time' (Not Used). A 'Count' field shows '4'. On the right side, there are three buttons: 'Start Scan', 'Export' (highlighted with a red box), and 'Clear'. A blue callout bubble with the text 'Click' points to the 'Export' button.

Index	Code	Type	Count
1	01234567891019	Interleaved2Of5	1
2	http://asreader.jp/	PDF417	2
3	ASTERISK	Code39	1
4	1234567890128	EAN13	1

Click "Export" to export the barcode data in the barcode list as a CSV file.

### 3.3. Clearing the Barcode List



The screenshot shows the 'Barcode Scan' tab in the AsReader application. The interface includes a control panel with the following elements:

- Encoding:  ASCII,  UTF8,  Shift-JIS
- Rescan Time: Not Used (dropdown menu)
- Count: 4
- Buttons: Start Scan, Export, and Clear (highlighted with a red box and a blue callout bubble labeled 'Click')

Below the control panel is a table displaying the scanned barcode data:

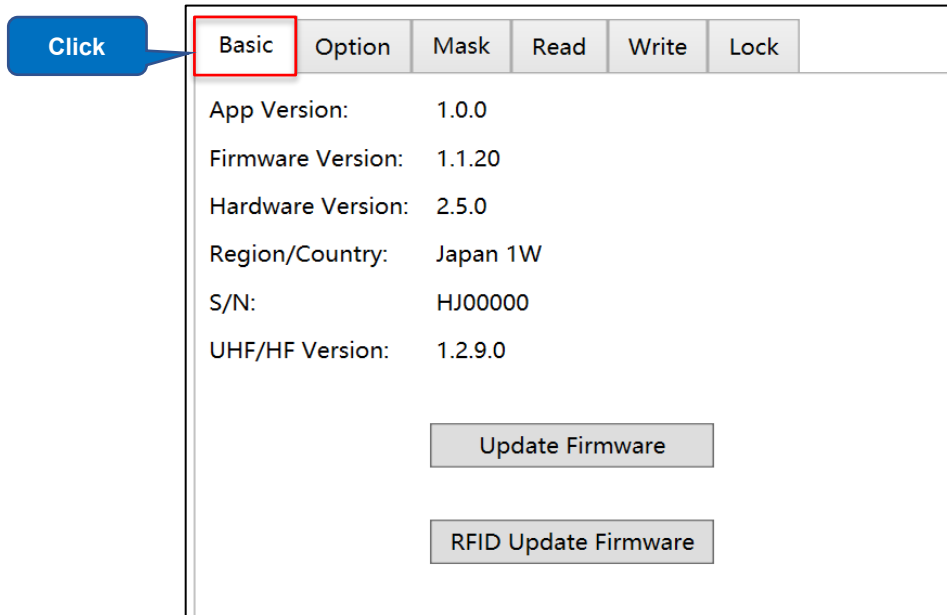
Index	Code	Type	Count
1	01234567891019	Interleaved2Of5	1
2	http://asreader.jp/	PDF417	2
3	ASTERISK	Code39	1
4	1234567890128	EAN13	1

Click "Clear" to clear the barcode data displayed in the barcode list.

# 4 Basics

## 4.1. Basic Information

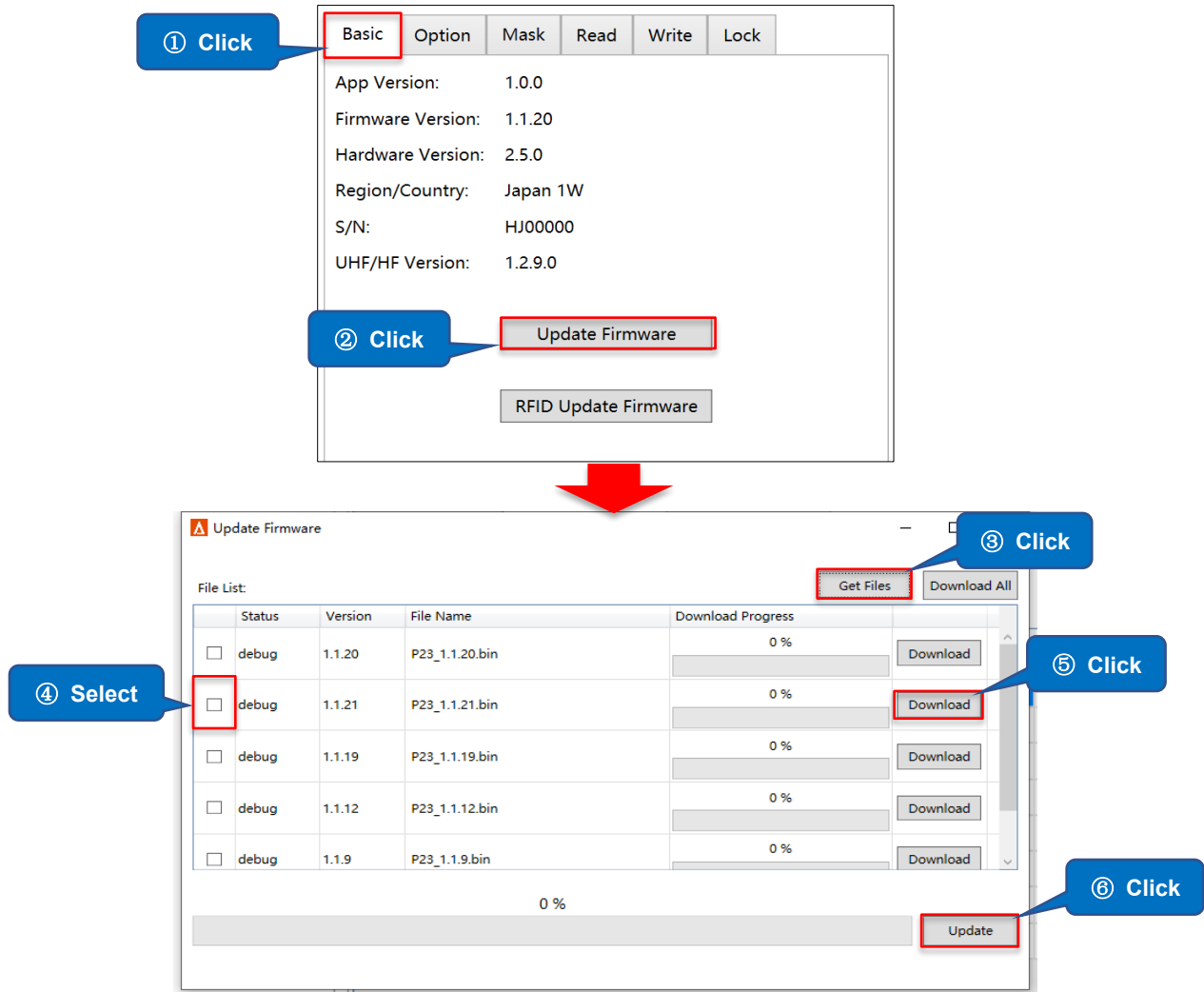
Click "Basic" and the basic information of the app and the AsReader are displayed.



- The meanings of the fields in the basic information are as follows:

Fields	Descriptions
App Version	The version of the app
Firmware Version	The firmware version of the AsReader
Hardware Version	The hardware version of the AsReader
Region/Country	The region or country where the AsReader is set
S/N	The serial number of the AsReader
UHF/HF Version	The firmware version of the RFID module

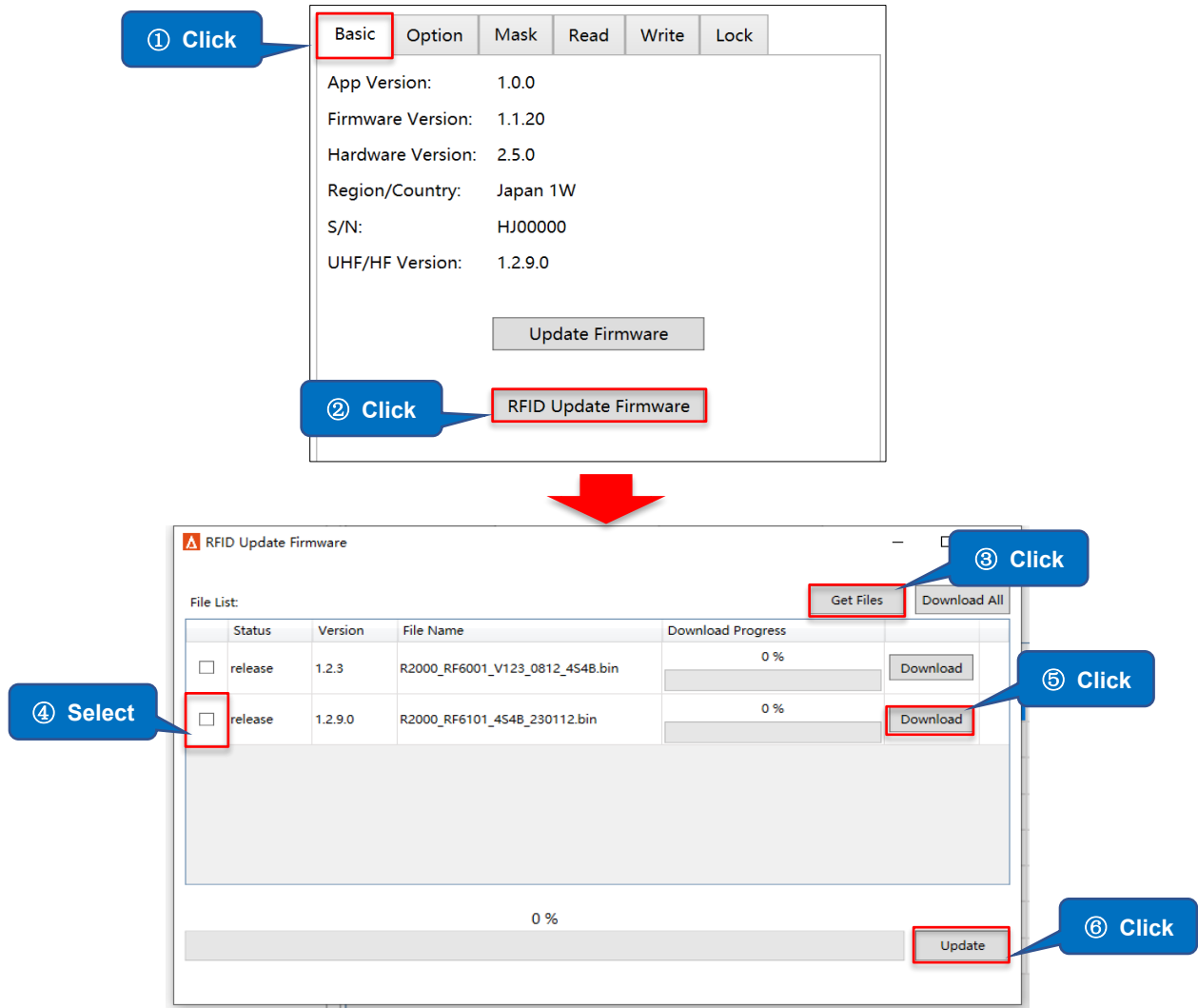
## 4.2. Firmware Update



- **Operating steps:**

1. Click "Basic".
2. Click "Update Firmware" to open the Update Firmware window.
3. Click "Get Files" to refresh the firmware file list. (Internet connection required.)
4. Select the firmware version file you want to use.
5. Click "Download" to download the file.
6. Click "Update" to start the update after the download of the file is complete.

### 4.3. RFID Module Firmware Update



● **Operating steps:**

1. Click “Basic”.
2. Click “RFID Update Firmware” to open the RFID Update Firmware window.
3. Click “Get Files” to refresh the firmware file list. (Internet connection required.)
4. Select the firmware file you want to use.
5. Click “Download” to download the file.
6. Click “Update” to start the update after the download of the file is complete.

# 5 Options

Click "Option" to configure RFID/Barcode parameters, buzzer volume, etc.

Tab	Setting	Value
Basic	Buzzer	High
Option	Idle Time(10ms)	0
Option	Sleep Time(s)	300
Option	Battery Interval(s)	0
Option	Auto Off Time(s)	300
Option	QValue	04
Option	MaxQ	15
Option	MinQ	00
Option	Link Profile	1
Option	Default Link Profile	1
Option	Barcode Timeout(s)	0
Option	Baud Rate	115200bps
Option	Frequency Automatic	<input checked="" type="checkbox"/>

## ① Buzzer

Set on/off and the sound volume of the buzzer.

When set to on, AsReader beeps at the set volume in the following cases:

- When the AsReader is turned on or off.
- When the AsReader is connected or disconnected to phones (or PCs).
- When the AsReader inventories RFID tags or scans 1D and 2D barcodes.
- When an RFID tag is read, written, locked, or killed.

This setting is saved to the AsReader.

② **Idle Time (10ms)**

Set the duration of the time the radio waves from the AsReader are stopped when the RFID tags are being inventoried.

Range: 0 to 65535.

This setting is saved to the AsReader.

\* Depending on the laws of various countries on the use of radio waves, the Idle Time should be set according to the following table.

Regulations	Idle Time
Radio law (JP)	Not less than 50ms
FCC (US)	Not less than 20ms
CE (EU)	Not less than 100ms

③ **Sleep Time (seconds)**

Set the time that the AsReader takes to go to sleep mode when not operated.

Range: 0 to 1800. When the value is set to 0, the sleep mode is turned off.

This setting is saved to the AsReader.

④ **Battery Interval (seconds)**

Set the interval when the AsReader sends battery information to the app.

Range: 0 to 1800.

⑤ **Auto Off Time (seconds)**

Set the automatic shutdown time for the AsReader in the sleep mode.

Range: 0 to 1800.

When the value is set to 0, the automatic shutdown function is turned off.

This setting is saved to the AsReader.

⑥ **QValue**

Select the fixed Q value. The number of slots used by the anti-collision algorithm is equal to  $2^Q$ .

Range: 0 to 15.

This setting is saved to the AsReader.

⑦ **MaxQ**

The maximum value of Q (read-only).

⑧ **MinQ**

The minimum value of Q (read-only).

⑨ **Link Profile**

Please refer to the following table for setting values.

0	The inventory speed is slow, but the inventory sensitivity is high.
1	Long inventory distance.
2	Same as "1". (for EU version)
3	Fast inventory.

⑩ **Default Link Profile**

Set the default value of the link profile. When the AsReader is connected to the app, the value of the link profile is the same as this default link profile.

This setting is saved in the app.

⑪ **Barcode Timeout (seconds)**

Set the scanning timeout period for the AsReader's barcode scanning.

Range: 4 to 300.

This setting is saved to the AsReader.

⑫ **Baud Rate**

Set the baud rate of the RFID module. We recommend that you do NOT change this.

This setting is saved to the AsReader.

⑬ **Frequency Automatic**

Set frequency hopping or fixed frequency.

Selected: frequency hopping

Not selected: fixed frequency

The LBT (Listen Before Talk) Channel can be set only when set to a fixed frequency.

This setting is saved to the AsReader.

\* This parameter is displayed only when the Region/Country is Japan.



**⑭ Save**

Click "Save" to save your settings. **IMPORTANT:** After changing settings, please be sure to click this button to save your changes.

**⑮ Default Setting**

Click "Default" to restore all settings to factory defaults.

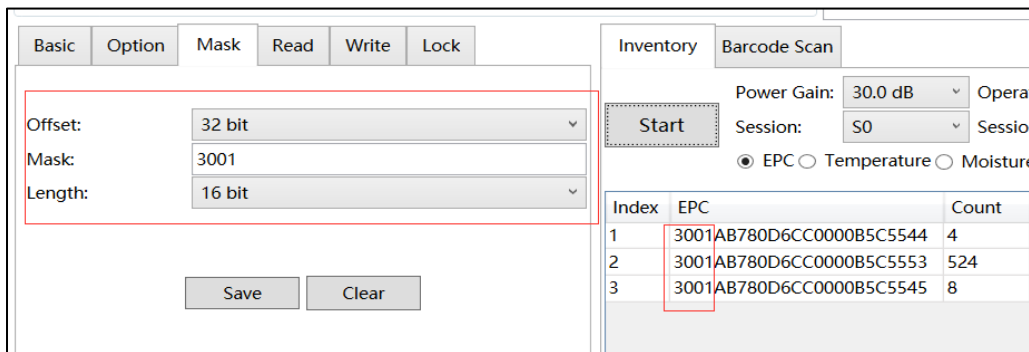
# 6 Mask

Click “Mask” to set RFID tag filtering parameters and use EPC bank data as filtering conditions.

When multiple tags are in the range of the AsReader, you can perform inventory, read, write, lock, and kill on the specific RFID tag by setting filtering parameters.

None of the parameters on this page are saved to AsReader.

### Example: Filtering RFID tags with the EPC numbers that start with “3001”



#### Operating steps:

- **To set filtering parameters:**

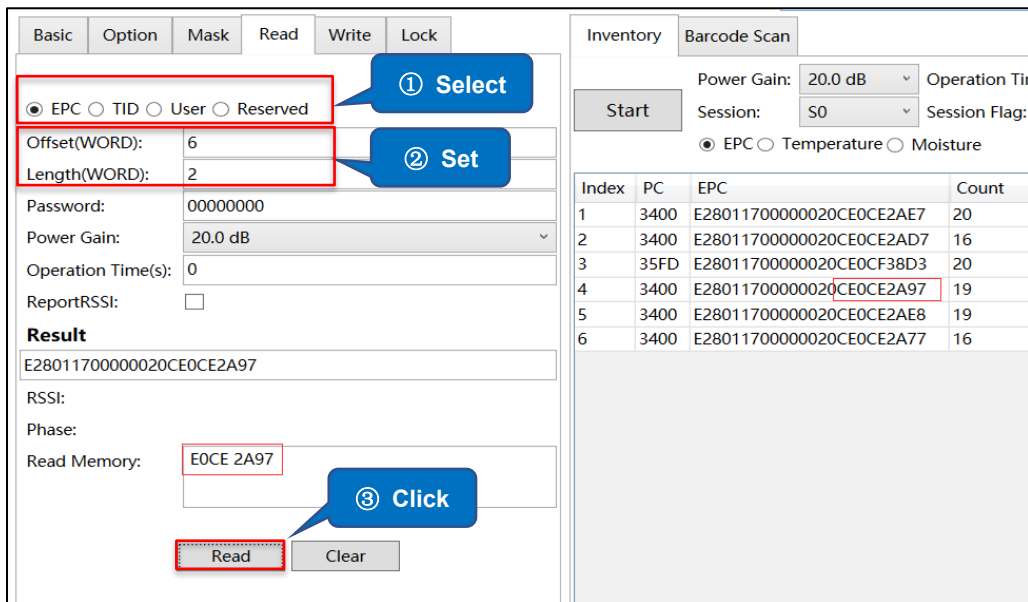
1. Select the start address (Offset): 32 bit (the first 32 bits are CRC and PC and the EPC number starts at the 32nd bit.).
2. Enter the value to be filtered (Mask): 3001
3. Select the filter length: 16 bit (4 bytes.)
4. Click “Save” to save the settings.

After saving the settings, click “Start” to inventory or perform Read, Write, Lock, or Kill on the RFID tags. Only the tags that meet the filtering conditions are displayed on the page as shown in the picture above.

# 7 Read

Click “Read” to set to read data at a specific location in the selected bank of the RFID tag. When multiple tags are in the range of the AsReader, RFID tags can be filtered by setting filtering parameters (See [6 Mask](#)).

### Example: Reading the data of the 7th and 8th word in the EPC bank of the RFID tag



#### Operating steps:

1. Select “EPC”.
2. Enter the start address (offset): 6
3. Enter the length of the data to read: 2 (8 bytes = 2 words)
4. Click “Read” to read. The read data is displayed in the “Read Memory” text box.

# 8 Write

## 8.1. How to Write to an RFID Tag

Click “Write” to write data to a specific location in the selected bank of the RFID tag. When multiple tags are in the range of the AsReader, RFID tags can be filtered by setting filtering parameters (See [6 Mask](#)).

**Example: Writing “11112222” to the third and fourth words of the EPC bank of the RFID tag**

Index	PC	EPC	Count
1	3400	E28011700000020CE0CE2A82	55

**Operating steps:**

1. Select “EPC”.
2. Enter the start address (Offset): 2
3. Enter the data to write.

4. Click "Write" to write the data. The EPC number before the overwrite is displayed in the "Result" text box. If the Write succeeds, the message "Write tag succeeded" is displayed in the notification area.

## 8.2. How to Change the Access Password

- **Method 1:**

**Example: Changing the access password of the RFID tag to 88888888:**

**Operating steps:**

1. Click "Write".
2. Select "Reserved" for the memory bank.
3. Enter the start address (Offset): 2
4. Enter the access password to set: 88888888
5. Click "Write" to write the data. The EPC number of the tag is displayed in the Result text box. When the writing succeeds, the message "Write tag succeeded" is displayed in the notification area.

● **Method 2:**

The screenshot shows the 'Lock' tab of the AsReader application. The 'Lock' tab is highlighted with a red box and a callout '1 Click'. The 'Access Password' field contains '22222222' and is highlighted with a red box and a callout '2 Enter'. The 'Set Access Password' button is highlighted with a red box and a callout '3 Click'. The 'Result' field displays the EPC number '111111700000020CE0CF5A63'.

**Operating steps:**

1. Click "Lock".
2. Enter the access password to set.
3. Click "Set Access Password" to set the access password. The EPC number of the tag is displayed in the Result text box. When the setting succeeds, the message "Write tag succeeded" is displayed in the notification area.

## 8.3. How to Change the Kill Password

- **Method 1:**

**Example: Changing the kill password of the RFID tag to 99999999:**

The screenshot shows the 'Write' tab of the AsReader software. The interface includes a top navigation bar with tabs: Basic, Option, Mask, Read, Write, and Lock. The 'Write' tab is active and highlighted. Below the tabs, there are four radio buttons: EPC, TID, User, and Reserved. The 'Reserved' radio button is selected. Below the radio buttons, there are several input fields: 'Offset' (0), 'Write Data' (99999999), 'Password' (00000000), 'Power Gain' (30.0 dB), and 'Operation Time(s)' (0). There is also a 'ReportRSSI' checkbox which is unchecked. At the bottom of the interface, there are two buttons: 'Write' and 'Clear'. The 'Write' button is highlighted with a red box. Four numbered callouts (1-4) indicate the steps: 1. Click 'Write' tab, 2. Select 'Reserved', 3. Set 'Write Data' to '99999999', and 4. Click the 'Write' button.

### Operating steps:

1. Click "Write".
2. Select "Reserved" for the memory bank.
3. Enter the start address (Offset): 0
4. Enter the kill password to set: 99999999
5. Click "Write" to write the data. The EPC number of the tag is displayed in the Result text box. If the writing succeeds, the message "Write tag succeeded" is displayed in the notification area.

● **Method 2:**

The screenshot shows the 'Lock' tab of the AsReader application. The interface includes several input fields and checkboxes: Kill Password, Access Password, EPC, TID, User, Password, Access Password (with a note 'only for set access password'), Kill Password (containing '11111111'), Power Gain (set to 30.0 dB), Operation Time(s) (set to 0), and ReportRSSI. Below these fields is a 'Result' section with an empty text box. At the bottom, there are two rows of buttons: the first row contains 'Lock', 'Unlock', 'Permalock', and 'Kill'; the second row contains 'Set Access Password', 'Set Kill Password', and 'Clear'. The 'Set Kill Password' button is highlighted with a red box and a callout '3 Click'. A callout '1 Click' points to the 'Lock' tab, and a callout '2 Enter' points to the 'Kill Password' field.

**Operating steps:**

1. Click "Lock".
2. Enter the kill password you want to set in the Kill Password text box.
3. Click "Set Kill Password" to complete the change. The EPC number of the tag is displayed in the Result text box. If the setting succeeds, the message "Write tag succeeded" is displayed in the notification area.



# 9 Lock/Kill

Click “Lock” to lock, unlock, permanently lock, and kill the selected tag.

When multiple tags are in the range of the AsReader, RFID tags can be filtered by setting filtering parameters (See [6 Mask](#)).

## 9.1.Lock

**Example: Locking the EPC bank of the RFID tag**

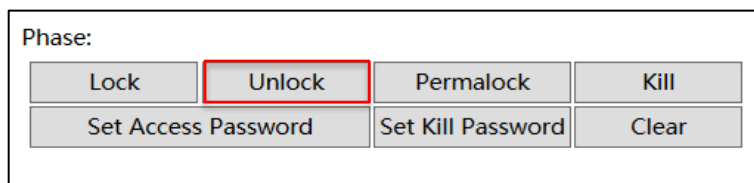
The screenshot shows the 'Lock' tab of the AsReader software interface. The interface includes a top navigation bar with tabs: Basic, Option, Mask, Read, Write, and Lock. The 'Lock' tab is selected and highlighted with a red box and a callout '① Click'. Below the navigation bar, there are several configuration options: Kill Password, Access Password, EPC, TID, and User. The 'EPC' checkbox is checked, and this section is highlighted with a red box and a callout '② Select'. Below these options, there are input fields for Password (containing '88888888'), Access Password, and Kill Password. The 'Access Password' field is highlighted with a red box and a callout '③ Enter the Access password'. Below the input fields, there are dropdown menus for Power Gain (set to 30.0 dB) and Operation Time(s) (set to 0). There is also a checkbox for ReportRSSI. Below the configuration options, there is a 'Result' section with a text area. At the bottom of the interface, there are several buttons: Lock, Unlock, Permalock, Kill, Set Access Password, Set Kill Password, and Clear. The 'Lock' button is highlighted with a red box and a callout '④ Click'.

**Operating steps:**

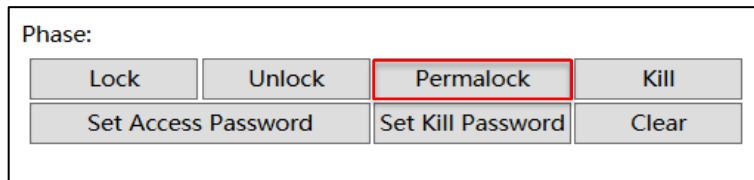
1. Click "Lock".
2. Select the bank that you want to lock. (Multiple selection is not supported.)
3. Enter the correct access password in the Password text box. The password cannot be "00000000". For the operation steps for changing the password, see [8.2 How to Change the Access Password](#).
4. Click "Lock". When the lock succeeds, "Lock succeeded" is displayed in the notification area.

These steps apply to other operations such as unlock or permanently lock.

**Unlock:**



**Permanently lock:**



\*1 When the Kill password area or Access password area of the RFID tag is locked, it cannot be written to/read with the default password "00000000". If other banks are locked, they cannot be written to but can be read using the default password "00000000".

\*2 If a bank is permanently locked, it cannot be written to or unlocked.

\*3 The TID bank is usually locked permanently as soon as the RFID tag leaves the factory.

## 9.2. Kill

The screenshot shows the 'Kill' tab in the AsReader application. The interface includes a tabbed menu at the top with 'Lock' selected. Below the menu are several input fields: 'Kill Password', 'Access Password', 'EPC', 'TID', 'User', and 'Password'. The 'Password' field contains '99999999'. Below these fields are 'Access Password' and 'Kill Password' labels with placeholder text. A 'Power Gain' dropdown is set to '30.0 dB', and 'Operation Time(s)' is set to '0'. There is a 'ReportRSSI' checkbox. A 'Result' section is empty. Below the 'Result' section are 'RSSI' and 'Phase' labels. At the bottom, there are two rows of buttons: 'Lock', 'Unlock', 'Permalock', 'Kill' in the first row, and 'Set Access Password', 'Set Kill Password', 'Clear' in the second row. The 'Kill' button is highlighted with a red dashed box.

### Operating steps:

1. Click "Lock".
2. Enter the correct kill password in the Password text box. The password cannot be 00000000. For changing the kill password, see [8.3 How to Change the Kill Password](#).
3. Click "Kill" to kill the tag. If it succeeds, the message "Kill tag succeeded" is displayed in the notification area.

**ASR-P252B C# Demo App**  
**User Manual**

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